

CENSUS OF AGRICULTURE: 1940

INTRODUCTION

This volume presents all available information from the 1940 Census of Agriculture relative to the value of farm products. The nature of the value items included on the 1940 Census Farm and Ranch Schedule, the type of tabulations made, and the arrangement of the material in this volume, all result from the growing demand for more comprehensive statistics relative to farm income for small geographic areas.

The value statistics included in this volume may be classified broadly under two general heads, viz., "calculated values," and "enumerated values." The two series of figures serve basically different purposes and should not be confused.

The calculated value statistics are presented in State table 18 and county table XVI. The values in these tables, with certain exceptions noted below, were secured by multiplying the reported figures on livestock inventories and crop and livestock production by unit prices. Such statistics represent, for the most part, total value, or what has sometimes been called "farm value." They do not approximate gross farm income, much less cash farm income, since no deductions have been made for the value of products used by farm households, for seed, for waste, or for the value of crops fed on the farm where produced, which latter is duplicated in the livestock income of that farm. On the other hand, the value of byproducts, except cottonseed, peanut hay, and redtop hay, is not included. Neither is the value of annual legumes grazed or hogged off included in the calculated value of crops harvested. For livestock products the calculated values do not always fully represent the value of production. For example, the values for dairy products relate, except in the case of butter churned, to quantities sold and not to the total production including milk used by farm households and milk taken by calves or otherwise fed on the farm. Again, the values for livestock butchered and livestock sold do not represent the value of livestock production since they make no allowance for changes in inventory numbers.

The enumerated value statistics are presented in State table 19 and county tables XVII to XX, inclusive, and are here referred to as the "value of farm products sold, traded, or used by farm households." These statistics were obtained by enumeration, and represent the totals of individual farm reports for the ten value of products questions on the 1940 Farm and Ranch Schedule. When the value of products used by farm households is included in the totals, as it has been in this volume, these value statistics may be used, with certain limitations noted below, as one approximate measure of gross farm income.

The enumerated statistics relating to value of products sold, traded, or used by farm households were tabulated in three different ways: First, by geographic areas; second, by total value of products per farm; and third, by major source of income. The results of the first or geographic area tabulation are shown in county table XVII, which gives information on the number of farms reporting and the value for each of the principal products or groups of products (sources of income), with comparable figures from the 1930 Census insofar as they are available. The results of the tabulation by total value of products per farm are shown in county tables XVIII and XX. For 1930, only the number of farms is available for each of the income size groups. County table XX shows not only the total value of products sold, traded, or used by farm households for each income size group, but also the number of farms reporting and the value for each of the principal sources of income under each income size group.

State table 19 and county table XIX present the results of the tabulation by major source of income. Here the farms are classified according to their major (single largest) source of income. The number of farms reporting and the value, for each of the ten sources of income under each major source or type

group, are shown in State table 19, while in county table XIX similar figures are given for the principal sources of income under each major source group. *Since the 1940 major source tabulation is not strictly comparable with the 1930 type of farm tabulation, the 1930 figures by type of farm are shown in State table 19 for reference purposes only.* A discussion of the differences in method of classification, 1940 and 1930, is given below under the heading "Major source of income and type of farm."

For the 1930 Census the statistics relating to value of livestock on farms on the census date and value of crop and livestock production were published in volume II for Agriculture (parts 1, 2, and 3), entitled, *Reports by States, with Statistics for Counties and a Summary for the United States*. The 1930 Census figures on value of farm products sold, traded, or used by operator's family were published in volume III for Agriculture (parts 1, 2, and 3), entitled, *Type of Farm, Reports by States, with Statistics for Counties and a Summary for the United States*. The 1930 volume III presented type of farm tabulations by counties for farm land; value of specified farm property; receipts from boarders, lodgers, etc.; specified livestock and livestock products; specified farm expenditures; number of farms by size; and number of farms by value of products, in addition to the value of products figures shown for 1930 in this volume.

GENERAL DEFINITIONS AND EXPLANATIONS

A farm.—The schedule form for 1940 was entitled "Farm and Ranch Schedule." This title was followed by a subtitle "including special agricultural operations." The following definition appeared on each schedule:

A farm, for Census purposes, is all the land on which some agricultural operations are performed by one person, either by his own labor alone or with the assistance of members of his household, or hired employees. The land operated by a partnership is likewise considered a farm. A "farm" may consist of a single tract of land, or a number of separate tracts, and the several tracts may be held under different tenures, as when one tract is owned by the farmer and another tract is rented by him. When a landowner has one or more tenants, renters, croppers, or managers, the land operated by each is considered a farm. Thus, on a plantation the land operated by each cropper, renter, or tenant should be reported as a separate farm, and the land operated by the owner or manager by means of wage hands should likewise be reported as a separate farm.

Include dry-lot or barn dairies, nurseries, greenhouses, hatcheries, fur farms, mushroom cellars, apiaries, cranberry bogs, etc.

Exclude "fish farms," fish hatcheries, "oyster farms," and "frog farms."

Do not report as a farm any tract of land of less than 3 acres, unless its agricultural products in 1939 were valued at \$250 or more.

In the enumerator's handbook the following instruction was given:

The definition of a farm found on the face of the schedule must be carefully studied by the enumerator. Note that for tracts of land of 3 acres or more the \$250 limitation for value of agricultural products does not apply. Such tracts, however, must have had some agricultural operations performed in 1939, or contemplated in 1940. A schedule must be prepared for each farm, ranch, or other establishment which meets the requirements set up in the definition. A schedule must be filled out for all tracts of land on which some agricultural operations were performed in 1939, or are contemplated in 1940, which might possibly meet the minimum requirements of a "farm." When in doubt, always make out a schedule.

Farming, or agricultural operations, consists of the production of crops or plants, vines, and trees (excluding forestry operations) or of the keeping, grazing, or feeding of livestock for animal products (including serums), animal increase, or value enhancement. Livestock, as here used, includes poultry of all kinds, rabbits, bees, and fur-bearing animals in captivity, in addition to mules, asses, burros, horses, cattle, sheep, goats, and hogs. Frequently, certain operations are not generally recognized as farming. This is especially true where no crops are grown or where the establishments are not commonly considered as farms.

A partial list of types of specialized agriculture and of operations not generally recognized as farming but for which Farm and Ranch Schedules were required was provided. This list included such operations as apiaries (bee farms), feed lots, greenhouses, hatcheries, mushroom cellars, etc.

Farm operator.—A "farm operator," according to the Census definition, is a person who operates a farm, either performing the labor himself or directly supervising it. For all practical purposes, the number of farm operators is identical with the number of farms.

Farms reporting.—The term "farms reporting," as used in the tables, indicates the number of farms for which the specified items shown in the particular table were reported. If there were 1,922 farms in a county and only 1,465 had dairy products sold or traded during 1939, and the enumeration of that item was complete, the number of farms reporting value of dairy products sold or traded for 1939 would be 1,465.

Livestock and livestock products.—For convenience, the term "livestock" in the Census Reports is used to include not only domestic animals such as horses, mules, cattle, swine, sheep, and goats, but also fur-bearing animals kept in captivity, poultry, and bees. It follows, then, that the term "livestock products," should include production from the above classes.

In the value tables in this volume there is one important exception to this general usage. In State table 19 and county tables XVII, XIX, and XX the term "livestock sold or traded" excludes poultry, bees, and fur-bearing animals.

In making comparisons between the various census years for any particular class of livestock shown in the accompanying tables, several points should be kept in mind, two of which are:

(1) It is characteristic for some classes of livestock to change in numbers between years through rather definite cycles, i. e., from a low point to a high point and back again over a period of years. These cycles often follow price relationships. A census taken every 5 years might fall at different points of the cycle and thus interfere with the determination of long-time trends. Cyclical changes have an effect on the volume of production.

(2) A variation in the months of enumeration seriously affects the comparability of the statistics for most kinds of livestock, again making it difficult to determine the trend in numbers between census periods. As noted in text table A, the 1940 and 1930 Censuses were taken as of April 1; the 1935, 1925, and 1920 Censuses as of January 1; and the 1910 Census as of April 15. In the period from January 1 to April 1 (or April 15) rapid changes are taking place in the numbers of each class of livestock due to decreases from farm slaughter, deaths, and marketings during this three-month period and to increases due to births and purchases. The net effect of these influences cannot be readily appraised. For the country as a whole, April 1 is in the midst of the season when colts, calves, lambs, spring pigs, and other livestock are born. In some parts of the country, a census on that date would include many young animals; in other parts, it would include relatively few of such animals; and in still other parts, varying proportions would be included. For this reason and because of the necessity of limiting the number of inquiries, those responsible for the 1940 census schedule thought it best that all recently-born animals should be excluded from the enumeration.

A change of date from January 1 to April 1 may seriously affect comparability in enumeration of migratory sheep in the western States. January 1 will usually find such sheep on the winter range, but April 1 may find them in a different county or even a different State, en route to or on the spring-fall range. The instructions to the enumerators were that sheep on open range be enumerated where the ranch headquarters were located.

The inquiries for 1940 were so worded that, when considering young animals and poultry, inclusions were made for horse and mule colts and calves over 3 months of age, pigs and kids (goat) over 4 months of age, lambs over 6 months of age, and poultry over 4 months of age, on the date of the census. Because of the varying age groups included in the different census years, text table A shows the age groups to which the value data refer.

In theory, a change in the date of the enumeration should have little effect on the volume of production reported for the previous calendar year. However, experience indicates that, when accurate records of production are not kept, daily production of milk and of eggs at the time of the enumeration does affect the total volume reported for a year. This means that a census of milk and egg production taken near the peak of production in April, for the previous year, would tend to give somewhat higher figures than a census taken in January which is near the low point.

Crops.—The 1940 Farm and Ranch Schedule was prepared in such manner that every crop grown on tracts of land listed as farms should have been enumerated. The crop inquiries were varied in different sections of the country so that separate questions could be carried for all crops widely grown in each major area. If a separate inquiry was not carried for a particular crop, that crop could be reported under one of several "catch-all" questions on the schedule. By using a different schedule for each region it was also possible to use the unit of measure that was most prevalent in an area for reporting production.

For definitions and explanations of the individual livestock and crop items, see chapters VII, VIII, and IX of volume III.

TOTAL VALUE OF LIVESTOCK ON FARMS AND OF LIVESTOCK PRODUCTS AND CROPS HARVESTED

For each agricultural census prior to 1920, the statistics relating to the value of the livestock inventory and the total value of livestock and crop production were enumerated figures. For the 1920 Agricultural Census the values for the livestock inventory and for livestock products were enumerated but the values for most crops were calculated by counties using State average unit values for each crop. For the 1925 and succeeding agricultural censuses, values were calculated for the livestock inventory and for livestock products, as well as for crops, but the method of calculation has varied. In the 1925 Agricultural Census the values were calculated by counties using, for most items, average unit values established for crop-reporting districts (groups of contiguous counties). For the 1935 Agricultural Census values were calculated by States only, using State average unit values. In the 1930 and 1940 Agricultural Censuses the values were calculated by counties using, for most items, county average unit values. The county unit values used in calculating total value of livestock on farms and total value of livestock products and crops harvested for the 1940 Census, as well as for the preceding censuses mentioned above, were obtained cooperatively by the Agricultural Statistics Division, Agricultural Marketing Service, Department of Agriculture and the Bureau of the Census.

Not all of the values for the 1940 Census shown in State table 18 and county table XVI are calculated values. For four items values were enumerated instead of production, because of the difficulty of finding a common production unit for purposes of enumeration. These four items are: Vegetables for sale, vegetables for farm household use, horticultural specialties, and forest products.

The following points should be observed in connection with the 1940 Census values presented in State table 18 and county table XVI:

Domestic animals.—The values for all species except goats represent the sum of the calculated values of individual age or sex groups. For goats the value is the sum of the calculated values for Angora goats and other goats.

Unspecified poultry.—Where the kind of poultry could not be identified, the unit value used was based on a weighted average of the unit values for identified kinds of other poultry in the same county and surrounding counties.

Dairy products.—The value of whole milk sold excludes the value of fluid sales of cream. The value of cream sold includes both the value of sales of sweet cream and the value of sales of sour cream (butterfat).

Cereals.—This item includes the value of the following crops: Corn for grain; sorghums for grain; and all wheat, rye, oats, barley, emmer and spelt, buckwheat, rice, and "mixed" grains threshed (or combined).

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TABLE A.—AGE, SEX, AND OTHER GROUPS ENUMERATED FOR VARIOUS CLASSES OF LIVESTOCK, 1940; WITH APPROXIMATELY COMPARABLE GROUPS, 1900 TO 1935

ITEM	1940 (April 1)	1935 (January 1)	1930 (April 1)	1925 (January 1)	1920 (January 1)	1910 (April 15)	1900 (June 1)
Horses and/or mules—farms reporting	Over 3 mo. old.	All ages.	All ages.	All ages.	(¹)	(¹)	(¹)
Horses and colts—farms reporting	Over 3 mo. old.	All ages.	All ages.	All ages.	All ages.	All ages.	All ages.
number	Over 3 mo. old.	Over 3 mo. old.	Over 3 mo. old.	Over 3 mo. old.	All ages.	Over 3½ mo. old.	1 yr. old and over.
Colts—farms reporting	3 to 27 mo. old.	Under 2 yr. old.	Under 2 yr. old.	Under 2 yr. old.	(¹)	(¹)	(¹)
number	3 to 27 mo. old.	Under 2 yr. old.	3 to 27 mo. old.	Under 2 yr. old.	Under 2 yr. old.	Under 2 yr. old.	Under 2 yr. old.
Mules and male colts—farms reporting	Over 3 mo. old.	All ages.	Over 3 mo. old.	All ages.	All ages.	All ages.	All ages.
number	Over 3 mo. old.	Over 3 mo. old.	Over 3 mo. old.	All ages.	All ages.	Over 3½ mo. old.	1 yr. old and over.
Mule colts—farms reporting	3 to 27 mo. old.	Under 2 yr. old.	Under 2 yr. old.	Under 2 yr. old.	(¹)	(¹)	(¹)
number	3 to 27 mo. old.	Under 2 yr. old.	3 to 27 mo. old.	Under 2 yr. old.	Under 2 yr. old.	Under 2 yr. old.	Under 2 yr. old.
Cattle and calves—farms reporting	Over 3 mo. old.	All ages.	All ages.	All ages.	All ages.	All ages.	All ages.
number	Over 3 mo. old.	All ages.	Over 3 mo. old.	All ages.	All ages.	Over 3½ mo. old.	1 yr. old and over.
Cows and heifers—farms reporting	Over 27 mo. old.	2 yr. old and over.	Over 27 mo. old.	2 yr. old and over.	(¹)	(¹)	(¹)
number	Over 27 mo. old.	2 yr. old and over.	Over 27 mo. old.	2 yr. old and over.	2 yr. old and over.	2 yr. old and over.	2 yr. old and over.
Kept mainly for milk production—farms reporting	Over 27 mo. old.	(¹)	Over 27 mo. old.	2 yr. old and over.	2 yr. old and over.	Over 15½ mo. old.	2 yr. old and over
number	Over 27 mo. old.	(¹)	Over 27 mo. old.	2 yr. old and over.	2 yr. old and over.	kept for milk.	kept for milk.
Kept mainly for beef production—farms reporting	Over 27 mo. old.	(¹)	Over 27 mo. old.	(¹)	2 yr. old and over.	(¹)	2 yr. old and over
number	Over 27 mo. old.	(¹)	Over 27 mo. old.	2 yr. old and over.	2 yr. old and over.	2 yr. old and over	not kept for milk.
Hogs and pigs—farms reporting	Over 4 mo. old.	All ages.	All ages.	All ages.	All ages.	Over 3½ mo. old.	All ages.
number	Over 4 mo. old.	All ages.	Over 3 mo. old.	All ages.	All ages.	Over 3½ mo. old.	All ages.
Sows and gilts—farms reporting	Farrowing between Dec. 1, 1939 and June 1, 1940.	Farrowing between Jan. 1 and June 1.	Farrowing between Jan. 1 and June 1.	Farrowing between Jan. 1 and June 1.	For breeding purposes, 6 mo. old and over.	For breeding purposes, 6 mo. old and over.	(¹)
number	Farrowing between Dec. 1, 1939 and June 1, 1940.	Farrowing between Jan. 1 and June 1.	Farrowing between Jan. 1 and June 1.	For breeding purposes, 6 mo. old and over.	For breeding purposes, 6 mo. old and over.	(¹)	(¹)
Sheep and lambs—farms reporting	Over 6 mo. old.	All ages.	All ages.	All ages.	All ages.	All ages.	All ages.
number	Over 6 mo. old.	Over 6 mo. old.	Over 6 mo. old.	All ages.	All ages.	Over 3½ mo. old.	1 yr. old and over.
Ewes—farms reporting	Over 6 mo. old.	1 yr. old and over.	Over 6 mo. old.	1 yr. old and over.	1 yr. old and over.	Over 3½ mo. old.	1 yr. old and over.
number	Over 6 mo. old.	1 yr. old and over.	Over 6 mo. old.	1 yr. old and over.	1 yr. old and over.	Over 3½ mo. old.	1 yr. old and over.
Yearling ewes—farms reporting	6 to 18 mo. old.	(¹)	6 to 18 mo. old.	(¹)	(¹)	(¹)	(¹)
number	6 to 18 mo. old.	(¹)	6 to 18 mo. old.	(¹)	(¹)	(¹)	(¹)
Other ewes—farms reporting	Over 18 mo. old.	(¹)	Over 18 mo. old.	(¹)	(¹)	(¹)	(¹)
number	Over 18 mo. old.	(¹)	Over 18 mo. old.	(¹)	(¹)	(¹)	(¹)
Goats and kids—farms reporting	Over 4 mo. old.	All ages.	All ages.	All ages.	All ages.	All ages.	All ages.
number	Over 4 mo. old.	All ages.	All ages.	All ages.	All ages.	All ages.	All ages.
Angora—farms reporting	Over 4 mo. old.	(¹)	All ages.	(¹)	1 yr. old and over	(¹)	(¹)
number	Over 4 mo. old.	(¹)	All ages.	(¹)	raised for fleeces.	(¹)	(¹)
Other goats—farms reporting	Over 4 mo. old.	(¹)	(¹)	(¹)	All ages, raised for fleeces.	(¹)	(¹)
number	Over 4 mo. old.	(¹)	All ages.	(¹)	Other than goats and kids raised for fleeces.	(¹)	(¹)
Chickens—farms reporting	Over 4 mo. old.	Over 3 mo. old.	Over 3 mo. old.	Age not specified.	Age not specified.	Over 3 mo. old.	(¹)
number	Over 4 mo. old.	Over 3 mo. old.	Over 3 mo. old.	Age not specified.	Age not specified.	Over 3 mo. old.	Over 3 mo. old (includes guineas).
Turkeys—farms reporting	Over 4 mo. old.	Over 3 mo. old.	(¹)	(¹)	Age not specified.	Over 3 mo. old.	(¹)
number	Over 4 mo. old.	Over 3 mo. old.	(¹)	(¹)	Age not specified.	Over 3 mo. old.	Over 3 mo. old.
Ducks—farms reporting	Over 4 mo. old.	(¹)	(¹)	(¹)	Age not specified.	Over 3 mo. old.	(¹)
number	Over 4 mo. old.	(¹)	(¹)	(¹)	Age not specified.	Over 3 mo. old.	Over 3 mo. old.
Geese—farms reporting	Over 4 mo. old.	(¹)	(¹)	(¹)	Age not specified.	Over 3 mo. old.	(¹)
number	Over 4 mo. old.	(¹)	(¹)	(¹)	Age not specified.	Over 3 mo. old.	Over 3 mo. old.
Guineas—farms reporting	Over 4 mo. old.	(¹)	(¹)	(¹)	Age not specified.	Over 3 mo. old.	(¹)
number	Over 4 mo. old.	(¹)	(¹)	(¹)	Age not specified.	Over 3 mo. old.	Incl. with chickens.
Pigeons—farms reporting	Over 4 mo. old.	(¹)	(¹)	(¹)	Age not specified.	Over 3 mo. old.	(¹)
number	Over 4 mo. old.	(¹)	(¹)	(¹)	Age not specified.	Over 3 mo. old.	(¹)
Quail—farms reporting	Over 4 mo. old.	(¹)	(¹)	(¹)	(¹)	(¹)	(¹)
number	Over 4 mo. old.	(¹)	(¹)	(¹)	(¹)	(¹)	(¹)
Pheasants—farms reporting	Over 4 mo. old.	(¹)	(¹)	(¹)	(¹)	(¹)	(¹)
number	Over 4 mo. old.	(¹)	(¹)	(¹)	(¹)	Over 3 mo. old.	(¹)
Hives of bees:							
Owned by operator and/or by others—farms reporting	Hives on operator's farm or on non-farm land.	(¹)	(¹)	(¹)	Hives of bees.	Hives on hand.	Hives on hand.
number	Hives on operator's farm or on non-farm land.	(¹)	(¹)	(¹)	Hives of bees.	Hives on hand.	Hives on hand.
Owned by farm operator—farms reporting	Hives on operator's farm or on non-farm land.	(¹)	Hives on operator's farm or elsewhere.	(¹)	(¹)	(¹)	(¹)
number	Hives on operator's farm or on non-farm land.	(¹)	Hives on operator's farm or elsewhere.	(¹)	(¹)	(¹)	(¹)
Owned by others—farms reporting	Hives kept on operator's farm.	(¹)	(¹)	(¹)	(¹)	(¹)	(¹)
number	Hives kept on operator's farm.	(¹)	(¹)	(¹)	(¹)	(¹)	(¹)
Fur animals in captivity:							
Silver fox—farms reporting	Females over 3 mo. old.	(¹)	(¹)	(¹)	(¹)	(¹)	(¹)
number	Females over 3 mo. old.	(¹)	(¹)	(¹)	(¹)	(¹)	(¹)
Mink—farms reporting	Females over 3 mo. old.	(¹)	(¹)	(¹)	(¹)	(¹)	(¹)
number	Females over 3 mo. old.	(¹)	(¹)	(¹)	(¹)	(¹)	(¹)

¹ Not available.

Other grains and seeds.—The 1940 and 1930 Census figures for this item include flax threshed, annual legumes harvested for seed, alfalfa seed, clover and grass seeds, mustard seed, sugar beet seed, sunflower seed, hempseed, castor beans, and miscellaneous seeds. Flower and vegetable seeds, other than those specified above, were included under horticultural specialties in the 1940 Census. In the 1930 Census the value of flower and vegetable seeds grown on farms was included under the value of "other grains and seeds," while receipts from sales of flower and vegetable seeds in 1929 by nurseries, greenhouses, etc., were included under sales of horticultural specialties.

Hay and forage.—The 1940 figures for this item include the value for four crops not specifically covered by the 1930 figures. These crops are: Corn hogged or grazed off, or cut for green or dry fodder; silage crops other than corn and sorghums; oats cut and fed unthreshed; and root and grain crops (other than corn and annual legumes) hogged or grazed off. Two of these items—silage crops other than corn and sorghums, and root and grain crops hogged or grazed off—could be reported only under the "other field crops" question on the 1930 General Farm Schedule. The figures on root and grain crops hogged or grazed off exclude root crops harvested for feed, which were tabulated as a separate item under this group in both 1940 and 1930. All of the above four items, except silage crops other than corn and sorghums, were reported on an acreage basis only, and the values for the 1940 Census were calculated by using "per acre" unit values. As previously noted the 1940 figures for hay and forage do not include the value of annual legumes grazed or hogged off.

Cottonseed.—For the 1930 Census the production of cottonseed was enumerated, but the 1940 Farm and Ranch Schedule did not include this item. Consequently, production of cottonseed in 1939 was calculated by counties on the basis of the enumerated production of cotton (lint), and the value of cottonseed was then secured by multiplying the calculated production of cottonseed by the county unit price.

Fruits and nuts.—The 1940 calculated value of production of citrus fruits is based upon county unit prices which represent the equivalent packing-house door returns for all methods of sale. For the other fruits and nuts the 1940 figures were calculated by using county unit prices based on weighted averages for all methods of sale.

All other crops.—The value of maple sirup and maple sugar produced is included in the value shown for this item. Since the 1940 Census enumerated value of forest products sold includes the value of maple sirup and maple sugar sold, there is a partial duplication of values between these two items. For crops of very limited distribution, the values were secured by correspondence with the growers. Where the kind of crop could not be identified, the value was based on a weighted average "per acre" unit value for identified minor crops in the same county and surrounding counties.

VALUE OF FARM PRODUCTS SOLD, TRADED, OR USED BY FARM HOUSEHOLDS

The 1940 Farm and Ranch Schedule included ten questions relating to the value of farm products sold, traded, or used by farm households. These questions in the order of their appearance on the schedule were as follows:

- Value of all dairy products sold or traded in 1939.
- Value of all livestock sold or traded in 1939, except poultry, bees, and fur animals.
- Value of all poultry, eggs, baby chicks, poult, etc., sold or traded in 1939.
- Value of wool, mohair, meat, hides, etc., bees, honey, wax, and fur animals and pelts sold or traded in 1939.
- Value of the crops reported under Questions 87-142 (including landlord's share) which were or are to be sold or traded.
(Crops, as used in this question, referred to field crops harvested in 1939.)
- Value of vegetables harvested in 1939 FOR SALE.
- Horticultural specialties, sales in 1939.
- Value of all fruits and nuts, including small fruits, produced in 1939, that were or are to be sold or traded.
- Value (estimated) of products of this farm in 1939 that were used by your family and by all households on this farm.
- Value of forest products sold in 1939.

The value of products information was secured in considerably more detail than in 1930 when the general farm schedule carried the following six value of products questions:

Value of grains, cotton, tobacco, hay, vegetables, fruits, plants, flowers, and all other crops grown in 1929 which were or are to be sold or traded.

Value of livestock sold or traded in 1929.

Value of milk, cream, butter, butterfat, meat, poultry, eggs, honey, wool, mohair, and other livestock products sold or traded in 1929.

Value of forest products sold in 1929.

Value (estimated) of products of this farm in 1929 that were used by your family.

Gross receipts from lodgers, boarders, and campers in 1929.

The arrangement of the value questions on the schedule was also changed materially. In 1930 all six value questions were carried in a single block; on the 1940 Farm and Ranch Schedule the ten value questions were distributed among the various crop and livestock questions, each value question following the crop or livestock questions upon which the value figure was based.

It will be noted that, in general, the value questions relating to livestock and livestock products, horticultural specialties, farm products used by farm households, and forest products apply to the calendar years 1939 and 1929; whereas the value questions for field crops, vegetables harvested for sale, and fruit crops are on a crop-year basis. That is, the values apply to quantities sold or to be sold or traded from crops harvested in 1939 and in 1929. One exception to the calendar year definition occurs in connection with the 1940 question on "other livestock products." Another exception to the crop-year definition occurs in connection with citrus fruit. These exceptions are discussed in detail below.

Farms with no farm products sold, traded, or used by farm households.—The numbers of farms shown for this classification in county tables XVII and XVIII represent farms for which there was a correct report of no products sold, traded, or used by farm households in 1939. These farms generally fall into one of two categories: new farms being brought into operation in the spring of 1940, or farms having a complete crop failure in 1939 for which there was also no income from livestock production in 1939 and no value for products used by farm households. This classification also includes a limited number of farms for which the only value of products reported was receipts from the rental of pasture. Where the schedule correctly represented a separate operating unit, it was necessary to classify such farms as having no farm products sold or traded, inasmuch as there was no value of products question on the 1940 Farm and Ranch Schedule under which rental from pasture could logically be included. In the 1930 Census the pasture rental on such farms was considered as income derived from crops. The "Flint Hills" of east central Kansas was one area in which this situation occurred.

Unclassified farms.—Where the figures on crop and livestock production and values were incomplete, the farm was placed in the "unclassified" category. In most cases these were farms on which the operator had moved between the time the 1939 crops were harvested and the time the census enumerator visited the farm. In 1929 this category also included farms that were not operated in 1929, as well as greenhouses, nurseries, and apiaries.

Farms reporting total value of farm products sold, traded, or used by farm households.—For 1939 this represents all farms for which there were usable reports on value of products, but excludes reports for farms with no products sold, traded, or used by farm households. In other words, the number of farms reporting total value of products, plus the unclassified farms, plus farms with no farm products sold, traded, or used by farm households equals all farms enumerated as of the census date. In 1929 the number of farms reporting for this item includes all farms classified by type regardless of whether or not any farm products were sold, traded, or used by farm households. For example, if a farm reported a complete crop failure, but the kind of crop could be reasonably identified and apparently represented the major crop on that farm,

the farm was classified according to the type represented by the crop failure. The 1939 count of farms reporting total value of farm products sold, traded, or used by farm households includes, therefore, some farms which, in the 1939 tabulation, were placed in the category of farms with no farm products sold, traded, or used by farm households.

Dairy products.—As previously shown, this question called for the value of all dairy products sold or traded in 1939. The question specified milk, cream, butter, and cheese, and the enumerator was instructed to explain if byproducts, such as buttermilk or skimmed milk, were sold which would give a high value for sales in relation to the quantities of whole milk, cream, and butter sold as reported in the block immediately preceding this value question. The value of goat milk or products sold was not to be included under this question, but was to be reported under "other livestock products." The value of dairy products purchased for resale was to be excluded, both from this value question and from the preceding items on quantities of whole milk, cream, and butter sold.

Livestock.—This value question followed immediately two livestock questions relating to the numbers of cattle, calves, hogs and pigs, and sheep and lambs bought and sold in 1939. It should be noted that the question specified, "except poultry, bees, and fur animals." The enumerator was instructed to explain if animals, other than the kinds listed in the preceding questions, were sold, the intention being that the value question should also cover sales of other kinds of livestock such as horses, mules, and goats. In handling the reports on this question, a distinction was made between livestock dealers and livestock feeders. Purchases and sales were included in the totals where other information on the schedule indicated that the operator had sufficient feed, either home-grown or purchased, or had sufficient pasture to add to the market value of the livestock. The statistics for this item represent, therefore, the totals of individual farm sales regardless of whether or not the animals were produced on the farm for which the sale was reported. Hence they are not directly comparable with livestock income figures based upon a State as a unit. This point is discussed in more detail below.

Poultry and poultry products.—As previously noted, hatcheries were included in the list of types of specialized agriculture for which Farm and Ranch Schedules were required and the enumerator was instructed to explain whenever the value entry for this question appeared high as a result of sales of baby chicks, poults, hatching eggs, etc. Schedules for State game farms are included. Quail, pheasants, and other game birds raised by such institutions for release were considered as sold.

Other livestock products.—The term "Other livestock products" is used in this volume to indicate the miscellaneous livestock products question, the wording of which was as follows: "Value of wool, mohair, meat, hides, etc., bees, honey, wax, and fur animals and pelts sold or traded in 1939." The value of goat milk and products sold, as well as the value of other miscellaneous livestock products sold, was included under this item. Although the wording of the question indicated that values for sales during the calendar year 1939 were desired, the following instruction was given in the enumerator's handbook:

Report here the value of goat milk and products sold as well as the value of wool shorn, mohair clipped, pelts taken from fur animals in captivity, and meat, hides, honey and wax produced in 1939 that were or are to be sold or traded. Also report the value of bees and fur animals sold or traded in 1939.

The value of meat sold applies to animals butchered by persons on farms, or for them on a custom basis, either on or off the farm. Sales of meat by slaughter houses and butchers, sometimes referred to as "local slaughter," are not included in these figures.

Field crops.—This question covers the value of the sales of field crops such as corn, sorghums, small grains, annual legumes, hay, clover and grass seeds, and miscellaneous crops including Irish potatoes and sweetpotatoes, cotton (lint), tobacco, sugarcane, sugar beets, broomcorn, popcorn, mint, hops, etc. In addition, the enumerator was instructed to include the value of sales of byproducts, such as cottonseed, beet pulp and tops, pea vines, etc., although no provision was

made for reporting the production of such byproducts on the schedule. On some schedules the value of sales of cottonseed apparently was not included in the value of field crops sold or traded. The enumerator was also instructed that where the farm operator was a tenant, the landlord's share should be included in reporting the value of sales, not only for this item, but also for all other value of products questions. No provision was made for reporting government benefit payments made under the programs administered by the Agricultural Adjustment Administration of the Department of Agriculture. However, crops upon which government loans had been secured were considered as sold unless they had been redeemed before the date of the census enumeration.

Vegetables for sale.—The values reported for this item represent a summation for each individual farm of the values reported for individual vegetable crops harvested in 1939 for sale. Irish potatoes and sweetpotatoes were not included under vegetables, but were included under field crops. The 1940 Census value figures shown for vegetables for sale in State table 19 and county tables XVII, XIX, and XX exclude the figures for unclassified farms, while those shown in State table 18 and county tables XIII (volume I) and XVI include data for all farms reporting vegetables.

Horticultural specialties.—The values reported for this item also represent a summation for each individual farm of the values reported for three items, viz., crops grown under glass and propagated mushrooms; nursery products; and flower and vegetable seeds, bulbs, and flowers and plants grown in the open. The figures for horticultural specialties shown in State table 19 and county tables XVII, XIX, and XX exclude the values reported by unclassified farms as well as the figures for all farms reporting area but no sales in 1939. The figures on horticultural specialties shown in State table 18 and county tables XIII (volume I) and XVI cover all farms reporting these items, including those reporting area but no sales in 1939.

Fruit and nut crops.—In general the figures reported for this question cover the value of all fruits and nuts produced in 1939 that had been or were to be sold at the time of the census enumeration. However, in Arizona and California, the value information on citrus fruit applies to the 1938-39 season; that is, to the crop harvested in 1938-39 from the bloom of 1938. For all other citrus-producing States, the value of sales of citrus fruit applies to the 1939-40 season; that is, to sales of the crop harvested in 1939-40 from the bloom of 1939. The value figures on fruit cover all tree fruits, nuts, and grapes, including small fruits and citrus. The values of sales of wild fruits and nuts are excluded with two exceptions: Wild blueberries were to be reported on the census schedule where the land was used primarily for their production; and wild or seedling pecans were also reported whether grown in orchards, farmyards, pastures, or elsewhere on the farm or ranch. The enumerator was instructed that, for all the value of products questions, gross receipts or values were desired without deductions for expenses of any kind. However, in the case of fruit, there was a noticeable tendency in some fruit areas for growers to report their net receipts instead of the gross value of all fruit sold or traded. This was particularly true in areas where certain marketing costs were commonly deducted from the payments to the grower for fruit sold. Another factor which may have contributed to this tendency to report net receipts for fruit crops was the absence of any questions on the schedule regarding expenditures for such items as spray materials, orchard cultivation, irrigation water, packages, and other production and marketing costs. In comparing the reported value of fruits and nuts sold with the calculated value of fruits and nuts harvested, allowance must also be made for the difference in definition of unit price previously noted.

Farm products used by farm households.—As mentioned above this question called for the value of products of the farm in 1939 that were used by the operator's family and by all households on the farm. The instructions to enumerators called attention to the fact that this question referred to the products of farms consumed by the operator's family, regardless of whether living on the farm or not, as well as the

value of products consumed by all other households on the farm. The definition of this question was broader, therefore, than in 1930 when the corresponding question asked for the value of products of the farm in 1929 that were used by the operator's family. In both 1940 and 1930 the following items were listed individually under the schedule question: Meat, milk, poultry, eggs, honey, vegetables, fruit, and firewood. The 1940 Farm and Ranch Schedule also specified fuel wood. Farm products of institutional farms which were used by inmates of the institution were considered as sold, and the value was included under the other nine value of products items. The same procedure was followed with respect to products of community and relief gardens.

Forest products.—The 1940 Census question included value of sales of firewood, fuel wood, standing timber, saw logs, veneer logs, pulpwood, mine props, tanbark, charcoal, fence posts, railroad ties, poles and piling, turpentine, resin, maple sirup and sugar, etc. Not all of these items were individually listed on the 1930 Census schedule, one notable exception being maple sirup and sugar.

Receipts from lodgers, boarders, and campers.—This question was included in the 1930 General Farm Schedule, but not on the 1940 Farm and Ranch Schedule. The values for this item were not included in the 1930 total value of farm products but were tabulated separately.

MAJOR SOURCE OF INCOME AND TYPE OF FARM

As previously mentioned, the figures from the 1940 Agricultural Census on value of farm products sold, traded, or used by farm households were tabulated by major source of income. In the 1930 Agricultural Census, the corresponding value tabulation was by type of farm. The two tabulations are not strictly comparable, but the 1930 value of products figures by type of farm are shown in State table 19 for reference purposes.

In making the tabulation by major source of income for the 1940 Census, the schedules for farms reporting farm products sold, traded, or used by farm households were sorted into ten major source groups corresponding to the ten value of products questions. The basis for this classification was the largest value of products entry. If the entries for two or more of the ten value of products questions were exactly the same, the farm was classified according to the item predominating as to major source in that locality. The procedure was, therefore, purely objective. It was possible for a sheep ranch to be classified with "livestock" as the major source of income or with "other livestock products" as the major source of income, depending upon the comparative gross receipts from sales of sheep and from sales of wool on that ranch in 1939. Similarly, a wheat farm, on which the 1939 wheat crop was a complete failure, would be classified as a subsistence farm, if the largest value entry was that for farm products used by farm households.

In the 1930 Census the value of products sold, traded, or used by farm households was used primarily in determining the type of farm, but the methods employed were necessarily more subjective than those used in connection with the 1940 Census. In the 1930 Census the farms were classified into thirteen types (including the "unclassified" group), while the "abnormal" group was further divided into five subtypes. For each of the major types, the sales of the major product (or group of products) had to represent 40 percent or more of the total value of all products of the farm before the farm was classified under that particular type. For the "self-sufficing" farms and certain of the "abnormal" subtypes, the minimum limit was 50 percent. "Stock-ranches" were differentiated from animal-specialty farms on the basis of the ratio of pasture land to cropland, the limits for this ratio being varied as between the East and the West. Special rules were employed for handling certain of the subtypes under the "abnormal" group, as well as for handling other unusual cases.

One of the principal differences between the 1940 and 1930 methods of classification results from the use of a "general" type in the 1930 tabulation. Where the value of products from any one source did not represent as much as 40 percent of the total value of all farm products, the farm was classified as "general." If the value of products from each of two sources represented 40 percent or more of the total value, the farm

was classified as "general" unless it was one of the specialized combination types such as cotton-tobacco, fruit-truck, dairy-poultry, etc. In the latter case it was classified according to the predominating type in that locality. In the 1940 Census tabulation all of these "general" farms are classified under some one of the ten major source groups.

In the 1930 Agricultural Census, greenhouses, nurseries, and apiaries were included with the "unclassified" farms. This excluded the value of products for such farms from the 1930 Census type-of-farm tabulation. In the 1940 Census, greenhouses and nurseries are included under the "Horticultural specialties" group, while the value of apiary products sold or traded was reported under "other livestock products."

1900 CENSUS CLASSIFICATION OF FARMS BY PRINCIPAL SOURCE OF INCOME AND BY VALUE OF PRODUCTS

A somewhat similar plan of tabulation was used in the 1900 Census of Agriculture when the farms were classified according to principal source of income. The United States figures on gross farm income for 1899 for farms classified by principal source of income are shown in text table B.

TABLE B.—FARMS REPORTING AND VALUE OF FARM PRODUCTS NOT FED TO LIVESTOCK ON FARMS WHERE PRODUCED, CLASSIFIED BY TWELVE PRINCIPAL SOURCES OF INCOME, FOR THE UNITED STATES, 1899

CLASSIFICATION	FARMS REPORTING		VALUE OF FARM PRODUCTS (DOLLARS)	
	Number	Per- cent of total	Total	Average per farm
PRINCIPAL SOURCE GROUPS				
All groups-----	5,737,372	100.0	3,742,129,357	652
Farms with principal source of income from--				
Livestock-----	1,564,515	27.3	1,232,398,228	788
Dairy produce-----	357,544	5.2	281,276,239	787
Hay and grain-----	1,319,854	23.0	1,003,196,537	760
Cotton-----	1,071,545	18.7	461,113,058	430
Tobacco-----	106,250	1.9	65,335,800	615
Sugar-----	7,174	0.1	19,787,923	2,758
Rice-----	5,217	0.1	5,993,485	1,149
Vegetables-----	155,788	2.7	103,629,507	665
Fruits-----	82,060	1.4	75,085,900	915
Flowers and plants-----	5,159	0.1	18,422,522	2,991
Nursery products-----	2,029	(1)	10,086,136	4,971
Miscellaneous-----	1,059,237	18.5	465,794,022	440

1 Less than one-tenth of 1 percent.

The following explanation of the classification procedure followed is taken from the text of the 1900 Agriculture Census Report:

"The basis for this classification is the value of the specified crops or products of 1899. If the value of the hay and grain raised on any farm exceeded that of any other crop and constituted at least 40 percent of the value of the products not fed to livestock, the farm was designated a 'hay and grain' farm. If vegetables were the leading crop, constituting 40 percent of the value of all products, the farm was designated a 'vegetable' farm. . . . 'Miscellaneous' farms were those whose operators did not derive their principal income from any one class of farm products. Those with no income in 1899 were classified according to the agricultural operations upon other farms in the same locality."

In the 1900 Census of Agriculture, the farms were also classified according to the amount of gross farm income in 1899, gross farm income here being defined as the value of farm products not fed to livestock on farms where produced. The United States figures on farms reporting and value of farm products for this tabulation are shown in text table C.

TABLE C.—FARMS REPORTING AND VALUE OF FARM PRODUCTS, CLASSIFIED BY VALUE OF FARM PRODUCTS NOT FED TO LIVESTOCK ON FARMS WHERE PRODUCED, FOR THE UNITED STATES, 1899

VALUE-GROUP	FARMS REPORTING		VALUE OF FARM PRODUCTS ¹	
	Number	Percent of total	Dollars	Percent of total
All groups-----	5,737,372	100.0	3,742,129,357	100.0
\$0-----	53,355	0.9		
\$1 to \$49-----	167,495	2.9	4,685,282	0.1
\$50 to \$99-----	305,446	5.3	22,167,786	0.6
\$100 to \$249-----	1,247,195	21.7	219,709,104	5.9
\$250 to \$499-----	1,602,375	27.9	583,812,965	15.6
\$500 to \$999-----	1,378,539	24.0	964,745,527	25.8
\$1,000 to \$2,499-----	829,142	14.5	1,202,624,998	32.1
\$2,500 and over-----	153,829	2.7	745,963,677	19.9

¹ Value of farm products not fed to livestock on farms where produced.

It should be observed that the 1900 Census definition of gross farm income is not strictly comparable with that employed in the 1940 and 1930 enumerations. Such an income figure includes, theoretically at least, the value of crops used for seed or wasted on the farm, the value for which is excluded under the 1940 and 1930 definitions. Furthermore, the 1900 Census figure on value of livestock sold represents only the value of sales of animals raised on the farm. In other words, the value of sales for purchased animals is excluded.

The 1900 Census figures on value of farm products by States and geographic divisions, together with a detailed explanation of the classification procedure followed and a reproduction of the schedule used will be found in the report of the Twelfth Decennial Census, 1900, volume V, Agriculture, part I.

INTERPRETATION OF THE STATISTICS

Definition.— In general the statistics on total value of farm products sold, traded, or used by farm households represent an approximate measure of *gross farm income*. If the value of farm products used by farm households is excluded from the totals, the resulting figures on value of farm products sold or traded represent an approximation of *cash farm income*. The user of these value statistics should keep in mind, however, that there are, theoretically at least, three basic types of figures on income from agricultural production in the United States:

- (1) United States farm income figures calculated on the basis of all farms in the United States as a unit. Interfarm sales, both within States and between States, would be excluded.
- (2) United States farm income figures calculated from farm income figures for individual States. Interfarm sales within States would be excluded, but interfarm sales between States would be included.
- (3) United States farm income figures representing an aggregate of the income for individual farms. Interfarm sales, both within States and between States, would be included.

The statistics on value of farm products sold, traded, or used by farm households, presented in this volume, clearly belong under the third classification. The duplication of income caused by the inclusion of interfarm sales is an important item, particularly in livestock feeding areas.

Unclassified farms.— As has been pointed out previously, the tabulations of value of farm products sold, traded, or used by farm households, for both 1940 and 1930, exclude the value of products for the "unclassified" farms. The extent of this incompleteness is shown, both in number of farms and in percent of all farms, in county table XVII.

Net income.— The figures on specified farm expenditures, shown in county table X (volume I) *should not be deducted* from the figures on value of products sold, traded, or used by farm households in an attempt to arrive at statistics on "net" income. As was pointed out in connection with the statistics on value of fruits and nuts sold or traded, census figures are not available for many important farm expenditure items. The cost of livestock purchased is also an important item in calculating "net" income.

Nonagricultural income.— Income from nonagricultural sources is *not included* in the figures on farm income for either the 1940 or 1930 Census enumerations. Because of the growth of part-time farming in recent years, nonagricultural income is an important item when comparisons are made involving the economic position of the individual farm rather than farming as an industry.

Government benefit payments.— As mentioned above, there was no provision on the 1940 Farm and Ranch Schedule for reporting the amount of government benefit payments. On some schedules where sugarcane or sugar beets were reported, there was evidence that the reported value of crops sold or traded included the government payment on sugarcane or sugar beets. In general, however, such payments appear to have been excluded from the figures on value of farm products sold, traded, or used by farm households.